Forest Service **R3** Regional Office

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Date: July 30, 2004

Larry Morin Regional Director Bureau of Indian Affairs Southwest Regional Office P.O. Box 26567 Albuquerque, NM 87125

Dear Mr. Morin:

On July 14, Dave Conklin of our staff met with John Waconda (Southwest Regional Office), Cal Pino (Southern Pueblos Agency), and Andy Quam (Southern Pueblos Agency) to evaluate a proposed dwarf mistletoe control project on the Jemez Pueblo. The proposed treatment area is 65 acres in size and located within the Canada De Cochiti land grant, in a remote area extending west from La Jara Canyon along the Santa Fe National Forest boundary.

The forest here is predominantly ponderosa pine, with occasional Douglas-fir, piñon and juniper. Site quality is low to moderate. The pine is predominantly small pole-size, with scattered groups of mature and overmature trees in the overstory. The area was selectively logged in the early 1970s, but has been largely unmanaged since. Densities range from 500 to over 1,000 trees per acre throughout much of the area. A few acres north of the proposed area were thinned to about 200 trees per acre in 1999 by a tribal crew.

Pine dwarf mistletoe (*Arceuthobium vaginatum* subsp. *cryptopodum*) infection is light and scattered in most of the area, but becomes more extensive in the northern and western portions. As would be expected, infection occurs in both the pole-size understory and the overstory. The proposal calls for removal of all visibly infected trees and thinning of uninfected trees to a 15-foot spacing (about 200 trees/acre). However, our discussions indicated that there are no immediate plans to remove the infected sawtimber.

We support implementation of this project, but recommend some modification in the layout and prescription:

First, we recommend <u>excluding</u> areas with extensive mistletoe infection, because the disease would probably intensify rapidly in these areas after thinning. Under present conditions, the trees are nearly stagnant and the mistletoe is inconspicuous. Andy has requested Dave's assistance in delineating these areas. Next, we agreed to <u>include</u> the area between the proposed stand and the area thinned in 1999 in order to provide a larger, more continuous treatment block. For similar reasons, we would discourage the planned "no-cut" buffer strips along intermittent streams and roadways.





Finally, the plan to "cut all visibly infected trees" (excluding the sawtimber) should probably be modified. Within infected areas, lightly infected (DMR 1 and 2) dominant and codominant trees are usually better to retain than intermediate or suppressed trees without visible infection; however, all visibly infected trees less than five inches dbh should be cut, since few of these would reach maturity.

With the above modifications, the project should be a sound way to manage dwarf mistletoe in this area. From a strict disease control standpoint, removal of the infected sawtimber would certainly be recommended; however, it would by no means be a "silver bullet," since the disease is already well established in the younger size classes. Whether or not to remove the larger infected trees is largely an economic decision. Over the long-run, probably only patch clear-cuts of at least 15 to 20 acres in size would truly "suppress" the disease. The strategy outlined here would result in a reasonably productive forest with much less sacrifice of accumulated growth than would be obtained under a patch clearcutting scenario. Probably the greatest benefit of the project would be improved tree growth and vigor, which would reduce long-term susceptibility to bark beetles.

The thinning would be conducted by a Jemez tribal crew, and it is expected that at least some of the material would be transported to the tribal woodyard. We recommend that the thinning be conducted between mid-July and mid-December to reduce the potential for a build-up of *Ips* bark beetles. Please contact us if you have any questions or need further assistance with this project.

Sincerely,

/s/ Debra Allen-Reid DEBRA ALLEN-REID New Mexico Zone Leader, Forest Health

cc: Leonard Lucero, John Anhold John Waconda, Southwest Regional Office Andy Quam, Southern Pueblos Agency